Figure 1

Figure 2

300

Module Header 310
Section Header Index 311
Program Header Offset 312
Section Header Offset 313
...

Program Header Table 320
Program Offset 321
...

Section Header Table 330
Section Header Name Index 331
Section Header Offset 332
Section Header Link 333
...
...

Section String Table 340
...
...

Entry Point Table 350
Symbol Index 351
...

Text Section 360
...

Data Section 370
...

Data Section 370
...

Symbol String Table 380
...

Symbol Table 390
Symbol Table Name Index 391
Section Table Section Header Index 392

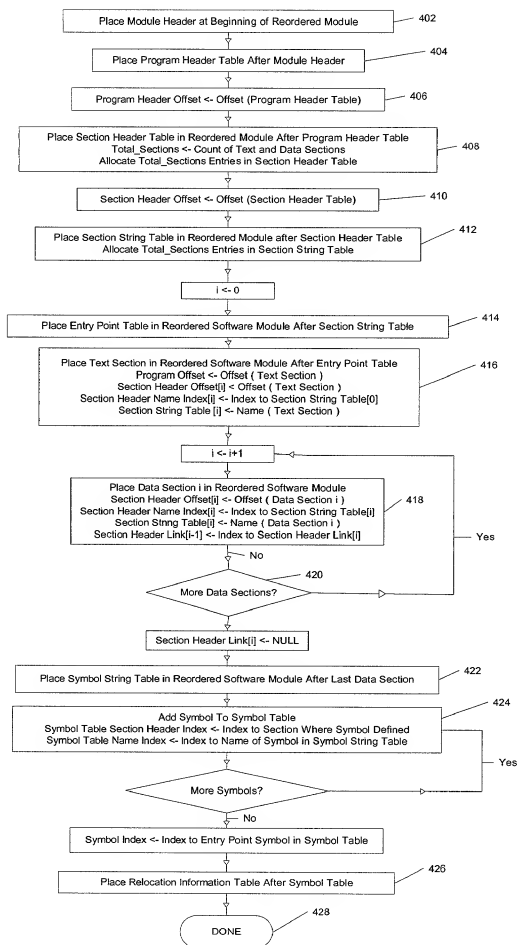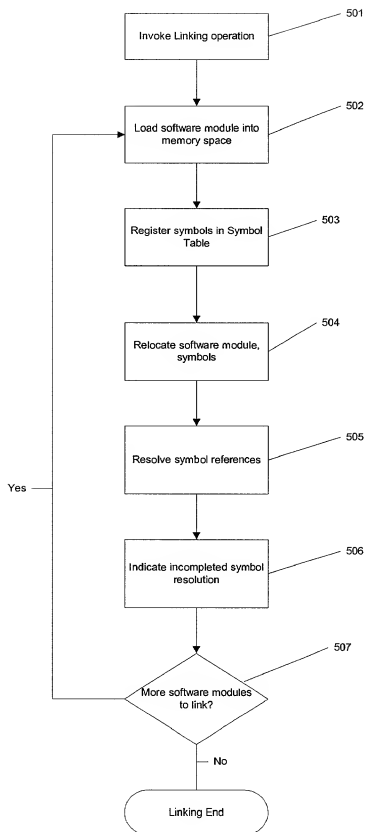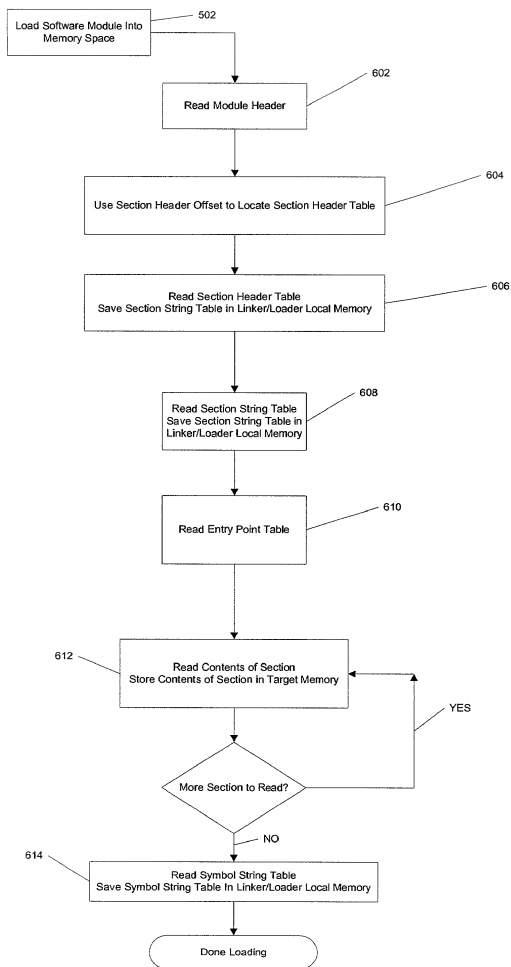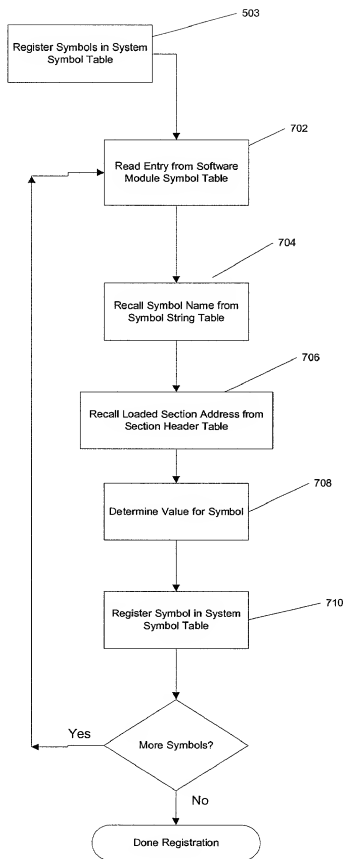| Relocation Information Table 395 |
| --- |
| Symbol Identifier 396 |
| Section Identifier 397 |
| Symbol Position Offset 398 |
| Reference Type 399 |
| ... |
| ... |

Figure 3

Figure 4

Figure 5

Figure 6

```
┌─────────────────────────┐
│ Register Symbols in System │ ─── 503
│     Symbol Table          │
└─────────────────────────┘
            │
            ▼
┌─────────────────────────┐
│  Read Entry from Software │ ─── 702
│   Module Symbol Table     │
└─────────────────────────┘
            │
            ▼
┌─────────────────────────┐
│   Recall Symbol Name from │ ─── 704
│     Symbol String Table   │
└─────────────────────────┘
            │
            ▼
┌────────────────────────────┐
│ Recall Loaded Section Address from │ ─── 706
│      Section Header Table         │
└────────────────────────────┘
            │
            ▼
┌─────────────────────────┐
│  Determine Value for Symbol │ ─── 708
└─────────────────────────┘
            │
            ▼
┌─────────────────────────┐
│  Register Symbol in System │ ─── 710
│      Symbol Table         │
└─────────────────────────┘
            │
            ▼
Yes ◄──── ◇ More Symbols? ◇
                │
                ▼ No
        ( Done Registration )
```
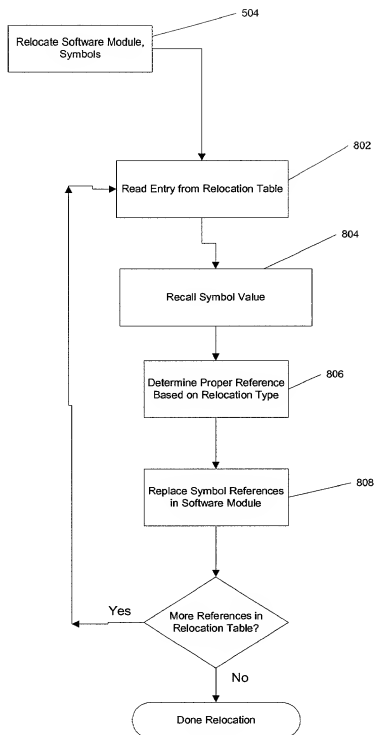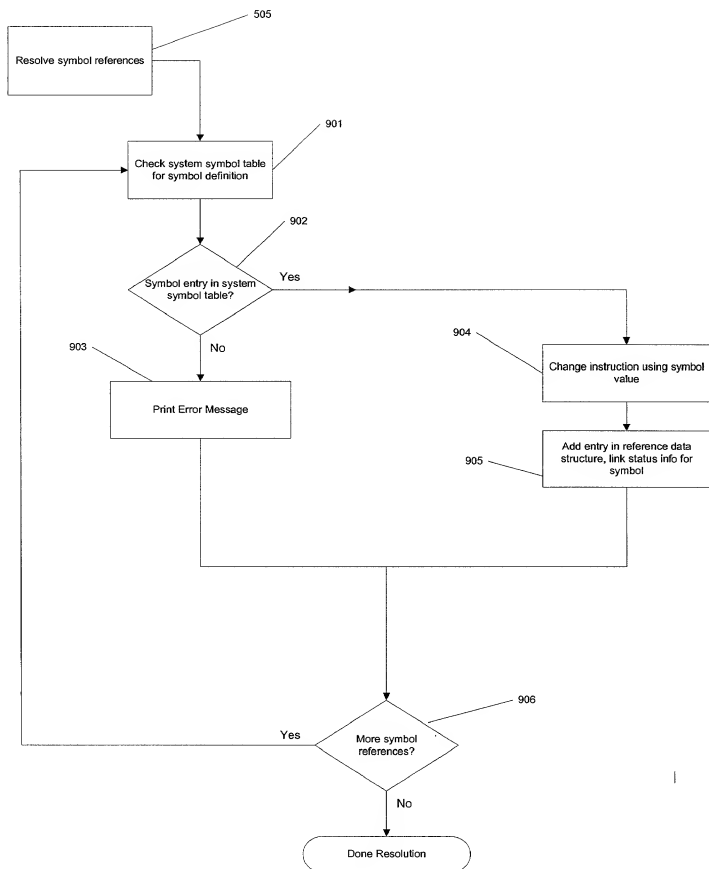
Figure 7

Figure 8

Figure 9
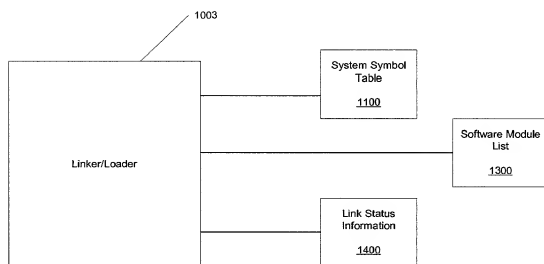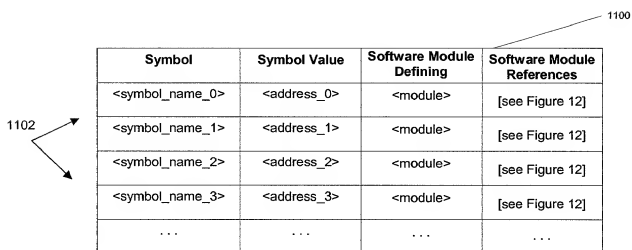
Figure 10

Symbol	Symbol Value	Software Module Defining	Software Module References
<symbol_name_0>	<address_0>	<module>	[see Figure 12]
<symbol_name_1>	<address_1>	<module>	[see Figure 12]
<symbol_name_2>	<address_2>	<module>	[see Figure 12]
<symbol_name_3>	<address_3>	<module>	[see Figure 12]
. . .	. . .	. . .	. . .

1100

1102

Figure 11

1200

Software Module	Reference Locations	Reference Offsets
<module_0>	<address_0>	<offset_0>
	<address_1>	<offset_1>
	<address_2>	<offset_2>
<module_1>	<address_0>	<offset_0>
<module_2>	<address_0>	<offset_0>
	<address_1>	<offset_1>
. . .	. . .	. . .

1202
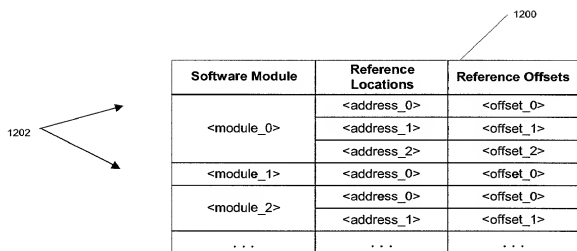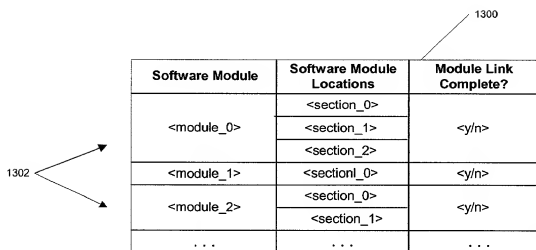
Figure 12

Software Module	Software Module Locations	Module Link Complete?
<module_0>	<section_0>	<y/n>
	<section_1>	
	<section_2>	
<module_1>	<sectionl_0>	<y/n>
<module_2>	<section_0>	<y/n>
	<section_1>	
. . .	. . .	. . .

1300

1302

Figure 13

1400

Software Module	Symbol	Reference Locations	Reference Base Addresses
<module_0>	<symbol_0>	<address_0>	<base_addr_0>
		<address_1>	<base_addr_1>
		<address_2>	<base_addr_2>
	<symbol_1>	<address_3>	<base_addr_3>
<module_1>	<symbol_2>	<address_0>	<base_addr_0>
<module_2>	<symbol_3>	<address_0>	<base_addr_0>
		<address_1>	<base_addr_1>
. . .	. . .	. . .	. . .

1402

Figure 14

Figure 15